

**To:** Summerhays, John[Summerhays.John@epa.gov]  
**From:** Schaufelberger, Daniel  
**Sent:** Fri 4/15/2016 6:42:51 PM  
**Subject:** RE: USG

John – I looked at the original spreadsheet and see that the emission number (615 tpy) and the slag usage number (39488 tpy) are both annual averages of two years of data. Let's go through this Monday morning. I'm not seeing what you're seeing.

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**From:** Summerhays, John  
**Sent:** Friday, April 15, 2016 1:25 PM  
**To:** Schaufelberger, Daniel <schaufelberger.daniel@epa.gov>  
**Subject:** USG

I usually get in on the order of 8:45, so I want to give you a little extra time to look at this. I spent time with your spreadsheet this morning. It looks to me like your emission factor is twice too high. It seems like you calculate the #/ton of slag emission factor by dividing a 2-year emission total (net total 615.53 tons) by a 1-year average slag amount (39488.54 tons). Instead of an emission factor of 31.1752 #/ton of slag, shouldn't the emission factor be half that (15.588 #/ton of slag)?

If you're reading this Friday, well, I can send you the spreadsheet if you want it, or you can look at this Monday morning before I come in. I don't feel bad having these folks do air quality characterization, but cutting the emission factor in half would result in an estimated typical emission rate that translates to a modeled impact of 61 ppb plus background. That said, WI's emission factor is about 2/3 of our emission factor, which models 70 ppb, which plus background probably violates.